

Abstracts

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of error terms in the utility function in several ways. The survey questionnaire includes four attributes associated with lung cancer in Korea (incidence rates, survival rates, treatment costs, and monthly insurance premium), socio-economic status, antecedent variables, and questions regarding risk averseness and subjective health evaluation. **RESULTS:** The estimates of MWTP between survival rate and monthly insurance premium and MTWP between total treatment costs for lung cancer and monthly insurance premium, by employing "Hybrid Conditional Fixed Effects Logit Model" to figure out the existence of heterogeneity of any observed and unobserved components, are reflecting ranges of 261 KRW–286 KRW and 3414 KRW–4538 KRW, respectively. **CONCLUSIONS:** Compared to female counterparts, male respondents have higher MWTP of monthly insurance premium for two related attributes. Besides, married and younger respondents, with higher income and education have more MWTP compared to their respective counterparts. One interesting point is that dependents' MWTP of survival rate is higher than that of insurance premium payers although MTWP of total treatment costs for dependents is significantly lower than premium payers' MWTP.

PCN121

USING DISCRETE CHOICE EXPERIMENTS TO ESTIMATE THE MARGINAL WILLINGNESS TO PAY OF INSURANCE PREMIUM FOR LIVER CANCER TREATMENT IN KOREA

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OBJECTIVES: This study, using DCE method, figures out the characteristics of the decision-making for liver cancer treatment and investigates the attributes affecting the respondents' choice. Also it ascertains marginal willingness to pay and relative preferences for liver cancer treatment among the general population of 600 respondents in Korea. **METHODS:** In the survey, the respondents are asked to choose more than one discrete choice option, resulting in multiple observations for each individual. For each pair-wise comparison of choice set, the respondent will make a choice among three alternatives; A, B, or opt out. Thus, the nested-logit model using full maximum likelihood allows us to empirically estimate multi-levels of dependent variables. For the robustness check of our empirical results, we try considering the nature of distribution of error terms in the utility function in several ways. The survey questionnaire includes four attributes associated with liver cancer in Korea (incidence rates, survival rates, treatment costs, and monthly insurance premium), socio-economic status, antecedent variables, and questions regarding risk averseness and subjective health evaluation. **RESULTS:** The estimates of MWTP between survival rate and monthly insurance premium and MTWP between total treatment costs for liver cancer and monthly insurance premium, by employing "Hybrid Conditional Fixed Effects Logit Model" to figure out the existence of heterogeneity of any observed and unobserved components, are reflecting ranges of 212 KRW–294 KRW and 3458 KRW–4777 KRW, respectively. **CONCLUSIONS:** Compared to female counterparts, male respondents have higher MWTP of monthly insurance premium for two related attributes. Besides, married respondents, with higher education have more MWTP compared to their respective counterparts. One interesting point is that MWTP of high income group is lower than that of low income counterparts. This might be related to a lower alcohol consumption of high incomers who are less prone to liver cancer compared to low incomers.

CANCER – Health Care Use & Policy Studies

PCN122

HPV VACCINE COVERAGE AND ADOPTION ACROSS THE UNITED STATES

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OBJECTIVES: Human Papilloma Virus (HPV) is a sexually transmitted disease (STD) and is the leading cause of cervical cancer. Merck's Gardasil, an HPV vaccine in the US, protects against cervical cancer and genital warts. The CDC recommends HPV vaccination for females 11–12 years old, yet vaccination rates vary significantly by state from 15.8% to 54.7%. The objective of this study was to evaluate coverage of HPV vaccination and explore explanation for variation across the United States. **METHODS:** Our study included analysis of CDC vaccination rates, American Community Survey (Census) data, and additional government agency datasets. The vaccination rate is defined as vaccination of the 1st dose (three doses are recommended in total). Health care system and socioeconomic characteristics were identified and evaluated with respect to HPV vaccine coverage. Regression models were run on each state-level variable separately. **RESULTS:** The correlation between HPV vaccine rates and the percent of children attending religious service on a weekly basis resulted in a significant inverse relationship. The analysis yielded a R^2 value of 0.41, an F -value of 33.47 and a -5.79 t Stat score. Teen birth rates also resulted in a negative correlation with a R^2 value of 0.18, an F -value of 10.78 and a -3.28 t Stat score. Pediatricians per 1000 state inhabitants and percent of people who completed a bachelor's degree yielded positive correlation to vaccination rates with R^2 values of 0.18 and 0.16, respectively. Factors that did not correlate to vaccination rates included cervical cancer rates, STD rates, abortion rates, and high school graduation rates. **CONCLUSIONS:** An array of socio-economic and health care system variables were correlated with the HPV vaccination rates by state. Public health programs focused on influencing these state-level variables may precipitate improvement in HPV coverage.

PREVALENCE AND CORRELATES OF HUMAN PAPILLOMAVIRUS VACCINATION IN ADOLESCENT GIRLS: RESULTS FROM NATIONAL SURVEY OF CHILDRENS HEALTH

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OBJECTIVES: To determine prevalence and correlates of Human Papillomavirus (HPV) vaccination in adolescent girls who were recommended to receive vaccine by their health care providers. **METHODS:** A retrospective cross-sectional analysis involving adolescent girls (11–17 years) was conducted using the 2007 National Survey of Children's Health (NSCH). The analysis focused on adolescent girls who were recommended to receive HPV vaccine. Descriptive weighted statistics was used to examine prevalence of HPV vaccination. Multivariate logistic regression within the conceptual framework of Andersen Behavioral Model was used to examine the correlates of HPV vaccination in this at-risk population. **RESULTS:** Of 14.43 million adolescent girls in the United States, 3.69 million or 25.54 % (95% Confidence Interval [CI], 24.02–27.06) were recommended to receive the HPV vaccine by their health care provider. Amongst those who were recommended, only 48.75% (95% CI, 45.37–52.13) received the HPV vaccine. The majority who received the HPV vaccine were in the 13–17 age groups (82.67%), white (66.94%), and non-Hispanic (84.83%). Multivariate logistic regression revealed that enabling (socioeconomic status) and predisposing (number of adults in the household and preventive medical care visit) factors were significantly associated with the HPV vaccination. Children living at 100–200% of the Federal Poverty Level (FPL) (Odds Ratio [OR] 0.54, 95% CI 0.30–0.98) were less likely to receive the vaccine than those living below 100% of the FPL. Children in households with two or more adults (OR 0.51, 95% CI, 0.33–0.80) were negatively associated and those with any previous preventive medical care visit (OR 2.28, 95% CI, 1.36–3.84) were positively associated with HPV vaccination. **CONCLUSIONS:** Less than half of the girls received HPV vaccine among those who were recommended by their health care provider. The study finding emphasizes importance of predisposing and enabling factors for HPV vaccination. Policy and educational efforts can focus on these factors to improve HPV vaccination rates.

PCN124

IDEAL VIAL SIZE FOR BORTEZOMIB: REAL WORLD DATA ON WASTE AND COST REDUCTION IN MULTIPLE MYELOMA (MM)

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OBJECTIVES: Single size vials of chemotherapy drugs may be a source of waste and increase in treatment costs. Bortezomib, a drug frequently used in MM treatments, is available in a 3.5mg vial (above the average dose commonly prescribed) without antimicrobial preservatives, making mandatory its administration within 8 hours of preparation. Through real world data collected from Evidencias@ a dedicated database of cancer treatments (www.evidencias.com.br) we aimed to demonstrate which would be the optimal vial presentation for Bortezomib. **METHODS:** From November 2007 to October 2009 all patients with MM treated with Bortezomib were identified on Evidencias@. Analysis of prescribed, dispensed and wasted doses, their costs and which would be the ideal vial size were performed. **RESULTS:** We identified 35 patients that received Bortezomib in this period (mean body surface area of 1.73 m²). Mean prescribed dose per infusion was 2.1 mg which generated a waste of 1.4 mg (40%) of each vial. Due to this waste, the total amount of the drug used was 1 907.6 mg at a cost of US\$1 192,849.98 to cover the prescribed amount of 1,216.14 mg (US\$727,923.08). The total waste was of 691.36 mg (US\$464,926.89). The patients received a total of 131 cycles (mean of 3.77). The mean waste was 4.89 mg per cycle and 14.4 mg per patient. If a 3 mg vial were available, (maintaining a proportional price to the 3.5 mg one) the total cost of treatment would be US\$994,836.88 (16.6% lower) and the drug waste would be reduced by 34.72% (9.4 mg per patient). **CONCLUSIONS:** A simple adjustment in vial size reduces Bortezomib waste by 34.72% and results in a cost reduction of 16.6%. Further models using different vial sizes, combined to dose adjustment and patient scheduling may increase the economy even more.

PCN125

NUMBER OF DOCETAXEL TREATMENT CYCLES AND OVERALL SURVIVAL FOR METASTATIC PROSTATE CANCER—RESULTS FROM A US LOCAL COMMUNITY PRACTICE

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OBJECTIVES: Docetaxel (D) is well recognized as the first-line chemotherapy in patients with metastatic prostate cancer (PC). Of interest is the relationship between the number of treatment cycles and overall survival (OS) benefit. This study investigated the relationship between number of cycles and OS in a community practice. **METHODS:** The Georgia Cancer Specialist Database (2003–2008) was used. Patients with initial stage IV PC receiving D were followed from the date of first D use to the earlier of death or loss to follow-up. The three-month period prior to the first D use was the baseline. Patients were stratified into <10 vs. ≥10 groups based on mean cycle number. OS was compared using the Kaplan-Meier curve. The impact of cycle number on OS was further examined using multivariate Cox model with adjustment of age, comorbidity, baseline PSA, baseline biphosphonate use, hormonal therapies and other